

METHOD AND DEVICE FOR DETERMINING REFRACTIVE COMPONENTS AND VISUAL FUNCTION OF THE EYE FOR VISION CORRECTION

ABSTRACT

A method and an instrument is provided for measuring aberration refraction of an eye with a first device for measuring the total aberration refraction of the eye and a second device for measuring the aberration refraction of the cornea of the eye. The component of aberration refraction caused by the lens caused by the lens is calculated using the measured total eye aberration refraction and the measured component of aberration refraction of the cornea mapped over the optical surfaces of the eye. Each component portion of the aberration refraction provides information usable for making appropriate corrective actions at the cornea, at the lens, or both as indicated by the mapped measurements and calculations.